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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/839,001	04/20/2001	Harald Apfelthaler	KWO-17702/01	2739
7590 09/13/2005 Gifford, Krass, Groh, Sprinkle, Anderson & Citkowski, P.C. Suite 400 280 N. Old Woodward Avenue Birmingham, MI 48009-5394			EXAMINER HORTON, YVONNE MICHELE	
			ART UNIT	PAPER NUMBER
			3635	
DATE MAILED: 09/13/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/839,001

Applicant(s)

APFELTHALER, HARALD

Examiner

Yvonne M. Horton

Art Unit

3635

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 15 June 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 3,4,6-11 and 20-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 21-27 is/are allowed.
- 6) ☒ Claim(s) 3,4,6-11,20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 103

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 3,4,6-11 and 20 stand rejected under 35 U.S.C. 103 as being obvious over US Patent #3,766,698 to DALLEN in view of US Patent #5,312,215 to ANQUETIN. Regarding claim 20, DALLEEN discloses the use of a plug (32) having upper end (as at 66) and a bottom end (BE), see the marked attachment, in combination with a muntin (30) having an outer surface (OS), an end (E), inner walls (IS) having a planar surface (40,42) that define a hollow space (31), see the marked attachment, and flanges (67'), a plurality of spring elements (56) such that the spring elements (56) are operable to engage the planar surface (40,42), see figures 2 and 4, and the plug (32) includes a body (50,52,54,78) having a longitudinal slot (134), column 6, line 33-39 and column 7, line 20-30, wherein the body (50,52,54,78) fits into the hollow space (31) of the muntin (30) wherein the plug body (50,52,54,78), upon insertion of a screw (114) into the longitudinal slot (134), is operable by "forcing the body (50,52,54,78)", column 6, lines 33-39, into the muntin (30). Upon insertion of the screw (114), the body (50,52,54,78) is also forced apart from one another, and into engagement with portions (34,36) of the muntin (30). In regards to the longitudinal slot (134), due to the fact that the longitudinal slot (134) is drilled through the gasket (32) and plug (100), and the upper end of the gasket (32) already has a different width at the top as at (90), the slot (134) formed therein, once drilled therethrough, would inherently open up into this different width area

Art Unit: 3635

(90) thereby creating a longitudinal slot (134) having a different width (90) at the upper end (as at 66) than that at the bottom end (BE). DALLEN discloses the basic claimed terminal plug except for the slot having a series of contiguous non-linear edges therealong. ANQUETIN teaches that it is known in the art to provide the slot (14) of a terminal plug with a series of threads (16,18), column 3, lines 11-15, such that the edges of the slot (14) includes a series of contiguous non-linear edges (as at 16,18 – the threads). It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide the slot of DALLEN with the threads thereby forming a series of contiguous non-linear edges therealong, in order to provide the terminal member with added resistance to removal or unwanted withdrawal of the fastener positioned within the slot. Threads, serrated edges, etc. are very well known in the art for having the ability to restrict movement between members. In reference to claims 3 and 4, the slot (134) is coaxially aligned with the plug body (50,52,54,78) and completely penetrates the plug body (50,52,54,78), see Figure 4. Regarding claim 6, again, due to the fact that the longitudinal slot (134) is drilled through the gasket (32) and plug (100), and the upper end of the gasket (32) already has a greater width at the top as at (90), the slot (134) formed therein, once drilled therethrough, would inherently open up into this greater width area (90) thereby creating a longitudinal slot (134) having a greater width (90) at the upper end (as at 66) than that at the bottom end (BE).

In reference to claim 7, ANQUETIN the slots (18) of ANQUETIN used to form the threads teaches that it is known in the art to provide a longitudinal slot (14) with slots (18). It would have been obvious to one having ordinary skill in the art at the time the

invention was made to provide the longitudinal slot of DALLÉN with slots of ANQUÉTIN, in order to increase the tension between the plug body and the screw thereby increasing the friction therebetween to resist separation thereof and securely fasten the two members together.

Claims 8-11 stand rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #3,766,698 to DALLÉN in view of US Patent #5,205,688 to SUNDSTROM. DALLÉN discloses the basic claimed muntin and terminal plug combination except for the use of the longitudinal slot having a slotted wall or teeth. SUNDSTROM teaches that it is known in the art to provide a slot (2) with teeth (5). Hence, it would have been obvious to one having ordinary skill in the art at the time the invention was made to provide the longitudinal slot of DALLÉN with the teeth of SUNDSTROM, in order to increase the tension between the plug body and the screw thereby increasing the friction therebetween to resist separation thereof and securely fasten the two members together. Regarding to claim 9, because the slot (134) has a widened area (as at 90 in figure 3) at the upper end (as at 66), the opposing walls that becomes smaller (see figure 4) towards the bottom end (BE). In reference to claim 10, obviously, it would have been obvious to one having ordinary skill in the art at the time the invention was made to form the teeth (5) of SUNDSTROM in the slot (134) of DALLÉN such that when the screw (114) is passed through the slot (134) a tip thereof (possible the ends of the threads) abuts the teeth (5) where provided with the commonly known slots or teeth to enforce "widening" of the slot (134). Regarding claim 11, the longitudinal slot (134) is drilled through the gasket (32) and plug (100), and the upper end of the gasket (32)

already has a greater width at the top as at (90), the slot (134) formed therein, once drilled therethrough, would inherently open up into this greater width area (90) thereby creating a longitudinal slot (134) having a greater width (90) at the upper end (as at 66) than that at the bottom end (BE).

Allowable Subject Matter

Claims 21-27 stand as being allowed.

Response to Arguments

Applicant's arguments filed 6/15/05 have been fully considered but they are not persuasive. Regarding the applicant's argument that the inclusion of the slot having a series of contiguous non-linear edges, as noted above, DALLEN as modified by ANQUETIN teaches slot with contiguous non-linear edges.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

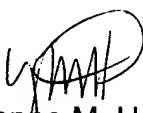
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Yvonne M. Horton whose telephone number is (571) 272-6845. The examiner can normally be reached on 6:30 am - 3:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Carl D. Friedman can be reached on (571) 272-6842. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Yvonne M. Horton
Art Unit 3635
09/02/05



Carl D. Friedman
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